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ABSTRACT

A tester for verifying the integrity of insulation in a branch circuit of a power distribution system. Two test circuits are included; the first providing an insulation test; and a second, a shared/grounded neutral test. In the insulation test, a 500-volt ac output limited to 5 milliamps is selectively applied to the pairs of wires of the branch circuit. If an output current of greater than 3 milliamps is recorded, an insulation failure is noted and the operator proceeds to the second test which applies a pulsed 3 volt, 1 ampere current-limited voltage across the suspected leads. One of the suspected leads is monitored with a portable ammeter to detect any pulse current.